Claim 36 (New): The isolated polypeptide of claim 28, comprising arginase family protein sequences at residues about 3 to about 14 and residues about 39 to about 57 of SEQ ID NO:83.

Claim 37 (New): The isolated polypeptide of claim 28, comprising an extracellular domain at residues about 1 to about 379 of SEQ ID NO:83.

REMARKS

Claims 22-37 are pending in this application. Applicants have amended claims 22-26, 28, 29, and 32. In the Office Action, the Examiner has indicated that claims 28, 29, and 32 are allowed. Applicants have amended claims 28, 29, and 32 to delete the dependency from rejected claim 27. New Claims 35-37 are presented with this Amendment.

The Examiner also made a determination that Applicants were not entitled to the benefit of an earlier filing date. The Examiner rejected claims 22-27, 30, 31, 33, and 34 under 35 U.S.C. § 112, first paragraph. Applicants respectfully traverse the rejections, determination of the benefit of the priority date and request that the Examiner consider the following remarks in response to the Office Action.

Amendments:

Claims 22-26 have been amended to include a functional limitation as discussed below. Allowed claims 28, 29, and 32 have been amended to no longer depend from claim 27. Amended claims 28, 29, and 32 are supported throughout the specification, including by original claims 28, 29, and 32.

New claims 35-37 are added herein. Support for new claims 35 and 36 may be found throughout the specification, including paragraph 596. Support for new claim 37 may be found throughout the specification, including paragraph 116.

Priority Determination:

The Examiner asserts that the subject matter defined in pending claims 22-34 has an effective filing date of December 1, 1999 due to a lack of enablement for the claimed invention in the parent (or provisional) application 09/254,311 (the '311 application), filed March 3, 1999. Applicants respectfully traverse this determination for at least the following reasons. The '311 application discloses the polypeptide, as the Examiner acknowledges and asserts several specific, substantial and credible utilities for the claimed invention. For example, the '311 application discusses the use of the claimed invention in protein-protein binding assays, biochemical screening assays, immunoassays and cell based assays (see on p. 37).

Furthermore, Applicants assert that the in addition to support found in the '311 application, the specification of the provisional application 60/075,945, filed on February 25, 1998, to which the '311 application claims priority also asserts several specific, substantial and credible utilities for the claimed invention. For example, the '945 application discusses the use of the claimed invention in protein-protein binding assays, biochemical screening assays, immunoassays and cell based assays (see p. 22)

For at least these reasons, Applicants respectfully submit that the proper priority date for the claimed invention is at least March 3, 1999. The Applicants request that the Examiner reconsider the determination of the benefit of the earlier filing date.

Rejection under 35 USC § 112, first paragraph:

The Examiner has rejected claims 22-27, 30, 31, 33, and 34 under 35 USC § 112, first paragraph, for allegedly not being described or enabled by the specification. Applicants respectfully request reconsideration of the rejection of claims 22-27, 30, 31, 33, and 34 for the reasons discussed below.

Enablement:

The Examiner has rejected claims 22-27, 30, 31, 33, and 34 under 35 USC § 112, first paragraph, for allegedly not being enabled by the specification. Applicants respectfully submit that the claims are enabled by the specification and request reconsideration by the Examiner.

The Examiner noted that while the claims are enabled for a polypeptide having at least 80% sequence identity to the polypeptide of SEQ ID NO: 83, or to the polypeptide lacking the signal peptide which polypeptide inhibits proliferation of stimulated T-lymphocytes, the specification does not provide enablement for fragments or variants that are not required to have such activity.

The Applicants have herein amended claims 22-26 to include a functional limitation. Specifically, Applicants have amended each of these claims to indicate that the isolated polypeptide is able to inhibit the proliferation of stimulated T-lymphocytes. This function of the claimed proteins is described throughout the specification, and is specifically supported by Example 34 on page 141.

Claims 27, 30, 31, 33, and 34 have not been amended. Claims 33 and 34, due to their dependency on newly amended independent claim 22, now include the functional limitation added by this amendment.

Claims 27, 30 and 31 have not been amended because each of these claims are directed to the wild-type polypeptide disclosed in the specification in Figure 32 (SEQ ID NO: 83) and thus are enabled by the specification. The extracellular domain of the claimed polypeptide is discussed on page 15, lines 6-8. The signal peptide for the claimed polypeptide is disclosed in Figure 32. Applicants have deposited Clone DNA45410-1250 with the American Type Culture Collection (ATCC). The deposit of Clone DNA45410 satisfies the enablement requirement of 35 U.S.C. §112, first paragraph. *In re Argoudelis*, 434 F.2d 1390, 1392 (CCPA 1970).

Accordingly, the Applicants assert that these rejections are improper and respectfully request that these rejections be withdrawn.

Written Description

The Examiner rejected claims 22-26, 33, and 34 as defining subject matter for which the specification does not provide sufficient written description and evidence of possession. Specifically, the Examiner asserts that these claims define subject matter not described in the specification in such a way as to reasonably convey to one skilled in the relevant art that the inventors had possession of the claimed invention at the time the application was filed.

The applicants have herein amended claims 22-26 to include a functional limitation. Specifically, Applicants have amended each of these claims to indicate that the isolated polypeptide is able to inhibit proliferation of stimulated T-lymphocytes. As indicated above, this function of the claimed proteins is described throughout the specification and is specifically supported by Example 34 on page 141.

Accordingly, all independent claims directed at variants of the wild-type now contain both structural and functional characteristics that identify the claimed polypeptides. Together, the structural and functional characteristics distinguish the isolated polypeptides that belong to the claimed genus from those excluded from the genus. Moreover, both the structural and functional characteristics are fully described in the specification as originally filed. Thus, the claims, as amended, define subject matter that is described in the specification in such a way as to reasonably convey to one skilled in the relevant art that the inventors had possession of the claimed invention at the time the application was filed.

Accordingly, Applicants respectfully assert that the amendments fully overcome this refection of the claims, and respectfully request that the Examiner reconsider and withdraw the rejection.

Allowable Subject Matter

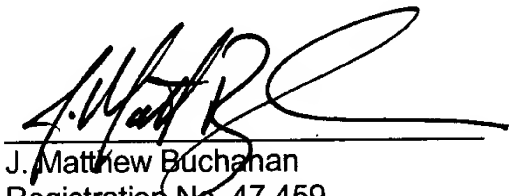
Applicant gratefully acknowledges the Examiner's allowance of claims 28, 29, and 32. Claims 28, 29, and 32 have been rewritten in independent form so as not to depend from a rejected base claim.

CONCLUSION

The Applicants respectfully assert that the application is now in condition for allowance. Should the Examiner feel a discussion would expedite the prosecution of this application, the Examiner is kindly invited to contact the undersigned.

The Commissioner is hereby authorized to deduct said fees from Brinks Hofer Gilson & Lione Deposit Account No. 23-1925. A duplicate copy of this document is enclosed.

Respectfully submitted,



J. Matthew Buchanan
Registration No. 47,459
Attorney for Applicant

BRINKS HOFER GILSON & LIONE
P.O. BOX 10395
CHICAGO, ILLINOIS 60610
(312) 321-4200